



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

| APPLICATION NO.                                                                                | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|------------------------------------------------------------------------------------------------|-------------|----------------------|---------------------|------------------|
| 10/048,017                                                                                     | 01/28/2002  | Pascal Magain        | MAGAINI             | 1293             |
| 1444                                                                                           | 7590        | 05/28/2004           | EXAMINER            |                  |
| BROWDY AND NEIMARK, P.L.L.C.<br>624 NINTH STREET, NW<br>SUITE 300<br>WASHINGTON, DC 20001-5303 |             |                      | GARRETT, DAWN L     |                  |
|                                                                                                |             |                      | ART UNIT            | PAPER NUMBER     |
|                                                                                                |             |                      | 1774                |                  |

DATE MAILED: 05/28/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/048,017

Applicant(s)

MAGAIN ET AL.

Examiner

Dawn Garrett

Art Unit

1774

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 16 March 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-15, 17-25 and 27-40 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 17 and 27-40 is/are allowed.
- 6) ☒ Claim(s) 1, 2, 4-7, 15, 18 and 21-25 is/are rejected.
- 7) ☒ Claim(s) 3, 8-14, 19 and 20 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 28 January 2002 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### *Continued Examination Under 37 CFR 1.114*

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on March 16, 2004 has been entered. The prior amendment filed February 17, 2004 has been entered as requested. Claims 16 and 26 are canceled. Claims 27-30, 33, and 34 were amended. Claims 1-15, 17-25, and 27-40 are pending.
2. The objection to the specification for lacking the heading "Brief Description of Drawings" previously set forth in the Office action of July, 17, 2003, paragraph 2, is withdrawn due to the amendment filed February 17, 2004.
3. The rejections of claims 27, 31, and 33 under 35 U.S.C. 112, second paragraph, set forth in the Office action mailed December 16, 2003, paragraphs 12-15, are withdrawn due to the amendment and upon reconsideration.
4. The rejection of claim 26 under 35 USC 102(b) as being anticipated by Hsieh et al. (US 5,674,635) is withdrawn due to the cancellation of claim 26.
5. The rejection of claims 26-28 under 35 USC 102(e) as being anticipated by Yap (US 6,307,528) is withdrawn due to the cancellation of claim 26 and amendment of claims 27 and 28.
6. The rejection of claims 27 and 30-33 under 35 USC 103(a) as being unpatentable over Hsieh et al. (US 5,674,635) is withdrawn due to the amendment of claims 27, 30, and 33.

Art Unit: 1774

7. The rejection of claims 29 and 34-39 under 35 USC 103(a) as being unpatentable over Hsieh et al. (US 5,674,635) in view of Schachter et al. (US 4,509,066) is withdrawn due to the amendment.
8. The rejection of claim 40 under 35 USC 103(a) as being unpatentable over Yap (US 6,307,528) in view of Ito et al. (US 5,652,067) is withdrawn due to the amendment.
9. The indication of allowable subject matter set forth in the Office action mailed December 16, 2003 for claims 1-15 and 18-25 is withdrawn.
10. Claim 17 is allowed for the reasons set forth in the Office action mailed December 16, 2003. Also, dependent claims of claim 17 have been found allowable.

***Claim Objections***

11. Claims 4 and 30 are objected to because of the following informalities: It is suggested that "(2)" which corresponds to the drawings be deleted from these claims since the numbers are not present in the parent claim. Appropriate correction is required.

***Claim Rejections - 35 USC § 112***

12. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

13. Claim 20 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Claim 20 depends upon one of claim 18 and 19. While claim 19 recites a steel sheet, claim 18 does not recite "the steel sheet". Accordingly, when claim 20 depends upon claim 18, it is not fully understood what component comprises the steel sheet.

***Claim Rejections - 35 USC § 103***

14. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

15. Claims 1, 2, 4-7, 15, 18, and 21-25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hung et al. (US 5,776,622). Hung et al. teaches an electroluminescent device with a substrate, electron-injecting electrode, an organic EL layer structure, and a hole-injecting electrode (see col. 3, lines 36-40). The substrate may be comprised of a number of materials including silicon and be covered with a dielectric materials such as silicon oxides or nitrides per the electrically insulated from the outside (see col. 3, lines 41-50). The electron-injecting electrode comprises two layers including a fluoride layer and a conductive layer comprised of metals or metal alloys (see col. 3, lines 51-59). The conductive layer comprised of metals or metal alloys read upon the instant electrically conductive surface of the substrate (it is further noted that the electrode may be considered part of the substrate according to instant claim 5). The conductive layer disposed on the substrate further reads upon the surface treatment of instant claims 22-24. Per instant claim 2, the hole injecting electrode at the top of the Fig. 2 device is transparent and allows light to emit from the top surface (see col. 4, lines 10-13). Also, the hole-injecting layer may be comprised of a thin metal layer and a further transparent encapsulating layer may be added upon the thin metal layer in order to protect the device per instant claims 15 and 25 (see col. 4, lines 10-21). The conductive layer of the electron-injecting electrode is

Art Unit: 1774

electrically connected to a current source per instant claim 4 (see Examples). Although Hung et al. fails to exemplify a devices comprising all components of instant claim 1, it would have been obvious to one of ordinary skill in the art at the time of the invention to have made a device according to the claims, because Hung et al. generally teaches all required components and methods of making the instant device.

***Allowable Subject Matter***

16. Claims 3, 8-14, 19, and 20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Response to Arguments***

17. Applicant's arguments with respect to the claims have been considered but are moot in view of the new ground(s) of rejection.

***Conclusion***

18. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dawn Garrett whose telephone number is 571-272-1523. The examiner can normally be reached Monday through Friday during normal business hours. Please allow the examiner twenty-four hours to return your call.

If reasonable attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Cynthia Kelly, can be reached at 571-272-1526. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications

Art Unit: 1774

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



DAWN GARRETT  
EXAMINER  
ART UNIT 1774

D.G.  
May 20, 2004